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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/510,211

05/04/2005

Martinus L. M. Bos

4662-328

8634

23117

7590

03/26/2008

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EXAMINER

YOON, TAE H

ART UNIT

PAPER NUMBER

1796

MAIL DATE

DELIVERY MODE

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PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/510,211	Applicant(s) BOS ET AL.	
	Examiner Tae H. Yoon	Art Unit 1796	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-13 is/are pending in the application.
 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-13 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. ____.
 3. ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. ____. |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date <u>10/5/04</u> . | 6) <input type="checkbox"/> Other: ____. |

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Huang et al (US 5,717,021).

Huang et al teach a polycarbonate composition containing pentaerythritol tetrastearate and polybutene copolymer in table 1 wherein 4 wt% of said polybutene and 0.15 wt.% of pentaerythritol tetrastearate are seen. See *In re Mills*, 477 F2d 649, 176 USPQ 196 (CCPA 1972); Reference must be considered for all that it discloses and must not be limited to its preferred embodiments or working examples.

Various articles such as automotive parts taught at col. 1 are typical injection molded articles. Use of other C₄ to C₁₆ polymers in an amount of about 0.1 to 8 (preferably 0.5 to 2.5) wt.% is also taught at col. 3, line 59 to col. 4, line 52.

A number average molecular weight of 100-5000 g/mol is also taught at col. 4, line 13 including the instant molecular weight

The instant invention further recites different ratios of said pentaerythritol tetrastearate and C₆ to C₁₈ polymers over Huang et al.

it would have been obvious to one skilled in the art at the time of invention to utilize the instant amount (such as 0.5 or 1.0 wt.%) of C₆ to C₁₆ poly-alpha-olefin polymer in examples of Huang et al since Huang et al teach C₄ to C₁₆ polymers and thus choosing a C₁₀ within a range (C₄ to C₁₆) and a molecular weight is a *prima facie*

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obviousness and since Huang et al teach employing various amounts of said poly-alpha-olefin polymer and molecular weights thereof absent showing otherwise.

Claims 1-13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Huang et al (EP 0 878 507).

Huang et al teach a polycarbonate composition containing polybutene copolymer and injection molded articles thereof in example. Polybutene with molecular weight *Mn=440 and Mw=550) is seen at page 4, lines 30-32.

Use of other C₄ to C₁₆ polymers and a number average molecular weight of 100-5000 g/mol is also taught at page 3, lines 12-30. See *In re Mills*.

The instant invention further recites employing pentaerythritol tetrastearate and ratios of said pentaerythritol tetrastearate and C₆ to C₁₈ polymers over Huang et al. However, Huang et al further teach employing additional lubricants such as pentaerythritol tetrastearate at page 4, lines 13-14.

It would have been obvious to one skilled in the art at the time of invention to utilize the instant amount pentaerythritol tetrastearate and C₆ to C₁₈ polymers in example of Huang et al since Huang et al teach C₄ to C₁₆ polymers and thus choosing a C₁₀ within a range (C₄ to C₁₆) is a *prima facie* obviousness and since Huang et al teach employing various amounts of said poly-alpha-olefin polymer and additional lubricants such as pentaerythritol tetrastearate absent showing otherwise.

Claims 1-13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Miller et al (EP 0 230 015 or US 4,626,566) in view of Mercx et al (US 2003/0096122 A1) and Huang et al (US 5,717,021).

The examiner points out EP for Miller et al since EP and US are equivalent.

Miller et al teach a polycarbonate composition containing poly-alpha-olefin polymer and injection molding thereof in examples. Miller et al teach the instant C₁₀ poly-alpha-olefin at page 2, lines 11-12.

The instant invention further recites employing pentaerythritol tetrastearate and ratios of said pentaerythritol tetrastearate over Miller et al.

However, use of a mixture of pentaerythritol tetrastearate and poly-alpha-olefin in polycarbonate and other thermoplastic polymers as mold releasing agents is well known as taught by Mercx et al (tables 1 and 2) and Huang et al.

It would have been obvious to one skilled in the art at the time of invention to utilize the instant amount of pentaerythritol tetrastearate of Mercx et al and Huang et al in examples of Miller et al since use of a mixture of pentaerythritol tetrastearate and poly-alpha-olefin as mold releasing agents is well known and since said mixture would be expected to work in a same manner absent showing otherwise.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tae H. Yoon whose telephone number is (571) 272-1128. The examiner can normally be reached on Mon-Thu.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Wu can be reached on (571) 272-1114. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Tae H Yoon
Primary Examiner
Art Unit 1796

THY/March 22, 2008

/Tae H Yoon/